



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/549,258	07/27/2006	Michael Anthony Pugel	PU040067	1713

24498 7590 03/17/2009
Robert D. Shedd
Thomson Licensing LLC
PO Box 5312
PRINCETON, NJ 08543-5312

EXAMINER

REGO, DOMINIC E

ART UNIT	PAPER NUMBER
----------	--------------

2618

MAIL DATE	DELIVERY MODE
-----------	---------------

03/17/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/549,258	Applicant(s) PUGEL ET AL.	
	Examiner DOMINIC E. REGO	Art Unit 2618	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 December 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. This communication is responsive to the application filed on December 22, 2008.

Claims 1-20 are pending and presented for prosecution.

Double Patenting

2. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

3. Claims 1-20 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-30 of copending Application No. 10/549,259. Although the conflicting claims are not identical, they are not patentably distinct from each other because:

Regarding instant claim 1, the co-pending application No. 10/549,259 of claim 1 teaches an apparatus, comprising: processing means for receiving broadcast signals and processing said received signals to generate analog signals without demodulating the received signals (Claim 1, lines 1-3); control means for enabling generation of said analog signals responsive to a request signal (Claim 1, lines 4-7); and wherein said analog signals are provided to a client device via a transmission medium connecting said apparatus and said client device (Claim 1, lines 5-7).

Regarding instant claims 2 and 12, the co-pending application No. 10/549,259 of claim 2 teaches an apparatus, wherein said transmission medium includes RG-59 cable.

Regarding instant claims 5 and 15, the co-pending application No. 10/549,259 of claim 1 teaches an apparatus, wherein: said control means detects an available frequency band on said transmission medium; and said available frequency band is used to provide said analog signals to said client device (Claim 1, lines 9-11).

Regarding instant claims 6 and 16, the co-pending application No. 10/549,259 of claim 5 teaches an apparatus, wherein said control means scans a plurality of frequency bands on said transmission medium to detect said available frequency band.

Regarding instant claims 7 and 17, the co-pending application No. 10/549,259 of claim 6 teaches an apparatus, wherein said control means detects said available frequency band based on a user input which selects said available frequency band.

Regarding instant claims 10 and 20, the co-pending application No. 10/549,259 of claim 1 teaches an apparatus, wherein said request signal is provided to said apparatus via said transmission medium (Claim 1, lines 5-7).

Regarding instant claim 11, the co-pending application No. 10/549,259 of claim 10 teaches a method for distributing signals from a gateway apparatus to a device (Claim 10, lines 1-2), comprising steps of: receiving broadcast signals (line 3); receiving a request signal from said device indicating a channel (lines 4-6); processing said received signals to generate analog signals corresponding to said channel responsive to said request signal, without demodulating said received signals (Claim 10, line 7); and providing said analog signals to said device via a transmission medium connecting said gateway apparatus and said device (Claim 10, lines 11-12).

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1,10,11, and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaia et al. (US Pub. No. 2006/0117340).

Regarding claim 1, Rajendran teaches an apparatus/a method, comprising:
processing means for receiving satellite signals and processing said received signals to generate analog signals without demodulating the received signals
(Paragraph 0035: Antenna 101 may receive various signals transmitted from satellites, etc. The received signals may be provided to filter 110. Filter 110 may perform a corresponding transfer function to generate signals of the frequencies of interest. The generated signals are provided to LNA 120 in the form of analog signals), except for control means for enabling generation of said analog signals responsive to a request signal; and

wherein said analog signals are provided to a client device via a transmission medium Cable connecting said apparatus and said client device.

However, in related art, Pavlovskaia teaches control means for enabling generation of said analog signals responsive to a request signal *(Paragraphs 0053-0055, especially, para. 0053, Pavlovskaia teaches the user may then select the enhanced content by pressing a request key and the set-top box will switch to the appropriate analog channel. Paragraph 0055, Pavlovskaia teaches FIG. 1F is a flow chart of the steps that are performed by the set-top box when a request is made for interactive content in a cable system that provides only one-way transmission of*

Art Unit: 2618

information content. A signal generated by a user input device is received by the set-top box. The set-top box responds by changing the tuner from the presently received channel to an interactive channel that has been assigned by the cable system. The set-top box then receives the corresponding analog signal for the interactive channel); and

wherein said analog signals are provided to a client device via a transmission medium Cable connecting said apparatus and said client device (Paragraph 0055, Pavlovskaia teaches FIG. 1F is a flow chart of the steps that are performed by the set-top box when a request is made for interactive content in a cable system that provides only one-way transmission of information content. A signal generated by a user input device is received by the set-top box. The set-top box responds by changing the tuner from the presently received channel to an interactive channel that has been assigned by the cable system. The set-top box then receives the corresponding analog signal for the interactive channel).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Pavlovskaia to Rajendran in order to view variety of programs.

Regarding claims 10 and 20, the combination of Rajendran and Pavlovskaia teach all the claimed elements in claim 1 and 11. In addition, Pavlovskaia teaches the apparatus/the method, wherein said request signal is provided to said apparatus (Figure 1, items 174,180,186) via said transmission medium (Figure 1, item 166).

Regarding claim 11, Pavlovskaia teaches a method for distributing signals from a gateway apparatus 146 to a device (Figure 1, items 174,180,186), comprising steps of:

receiving a request signal from said device indicating a channel (*Paragraphs 0053-0055, especially, para. 0053, Pavlovskaia teaches the user may then select the enhanced content by pressing a request key and the set-top box will switch to the appropriate analog channel. Paragraph 0055, Pavlovskaia teaches FIG. 1F is a flow chart of the steps that are performed by the set-top box when a request is made for interactive content in a cable system that provides only one-way transmission of information content. A signal generated by a user input device is received by the set-top box. The set-top box responds by changing the tuner from the presently received channel to an interactive channel that has been assigned by the cable system. The set-top box then receives the corresponding analog signal for the interactive channel*);

providing said analog signals to said device via a transmission medium connecting said gateway apparatus and said device (*Paragraph 0055, Pavlovskaia teaches FIG. 1F is a flow chart of the steps that are performed by the set-top box when a request is made for interactive content in a cable system that provides only one-way transmission of information content. A signal generated by a user input device is received by the set-top box. The set-top box responds by changing the tuner from the presently received channel to an interactive channel that has been assigned by the cable system. The set-top box then receives the corresponding analog signal for the interactive channel*), except for processing said received signals to generate analog

Art Unit: 2618

signals corresponding to said channel responsive to said request signal, without demodulating said received signals.

However, in related art, Rajendran teaches processing said received signals to generate analog signals corresponding to said channel responsive to said request signal, without demodulating said received signals (*Paragraph 0035: Antenna 101 may receive various signals transmitted from satellites, etc. The received signals may be provided to filter 110. Filter 110 may perform a corresponding transfer function to generate signals of the frequencies of interest. The generated signals are provided to LNA 120 in the form of analog signals*).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Rajendran to Pavlovskaja in order to view variety of programs.

6. Claims 2 and 12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaja et al. (US Pub. No. 2006/0117340) and further in view of Zydonik (WO 02/25847).

Regarding claims 2 and 12, the combination of Rajendran and Pavlovskaja fail to teach the apparatus/the method, wherein said transmission medium includes RG-59 cable.

However, in related art, Zydonik teaches the apparatus/the method, wherein said transmission medium includes RG-59 cable (Page 8, lines 3-13).

Art Unit: 2618

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Zydonik to Rajendran and Pavlovskaia in order to transmit data/video to the set-top box.

7. Claims 5,6,15, and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaia et al. (US Pub. No. 2006/0117340) and further in view of Slaney et al. (US Pub. No. 2002/0062481).

Regarding claims 5 and 15, the combination of Rajendran and Pavlovskaia fail to teach the apparatus/the method, wherein:

said control means detects an available frequency band on said transmission medium; and

said available frequency band is used to provide said analog signals to said client device.

However, in related art, Slaney teaches the apparatus/the method, wherein:

said control means detects an available frequency band (available spectrum) on said transmission medium (*Paragraph 0028: Slaney teaches set top box 28 carries multiple channels and is conveyed to a tuner 48 which selects on frequency band out of the available spectrum or frequency*); and

said available frequency band is used to provide said analog signals to said client device (*Paragraph 0028: Slaney teaches a broadband analog signal (e.g., 680, 750,*

Art Unit: 2618

860 MHz) received by the set top box 38 carries multiple channels (available frequency band)).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Slaney to Rajendran and Pavlovskaja in order to display various program for viewing.

Regarding claims 6 and 16, the combination of Rajendran, Pavlovskaja and Slaney teach all the claimed elements in claims 5 and 15. In addition, Slaney teaches the apparatus/the method, wherein said control means scans a plurality of frequency bands on said transmission medium to detect said available frequency band (Paragraph 0028).

8. Claims 7 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaja et al. (US Pub. No. 2006/0117340) in view of Slaney et al. (US Pub. No. 2002/0062481) and further in view of Schober et al. (US Pub. No. 2001/0044835).

Regarding claims 7 and 17, the combination of Rajendran, Pavlovskaja and Slaney fail to teach the apparatus/the method, wherein said control means detects said available frequency band based on a user input which selects said available frequency band.

However, in related art, Schober teaches the apparatus/the method, wherein said control means detects said available frequency band based on a user input which selects said available frequency band (Para. 0010).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Schober to Rajendran, Pavlovskaia and Slaney in order to select the content to be communicated the receiver.

9. Claims 3,8,9,13, 18, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaia et al. (US Pub. No. 2006/0117340) and further in view of Stoddard et al. (US Patent Application Publication #2004/0085143).

Regarding claims 3 and 13, the combination of Rajendran and Pavlovskaia teach all the claimed elements in claim 1 and 11. In addition, Rajendran teaches the apparatus/the method, wherein said processing means includes:

Frequency-converting means for converting said received signals from a first frequency band to a second frequency band to generate frequency converted signals (Para. 0039). Both fail to teach filtering means for filtering said frequency converted signals to generate said analog signals.

However, in related art, Stoddard teaches filtering means for filtering said frequency converted signals to generate said analog signals (Paragraph 0110).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Stoddard to Rajendran and Pavlovskaia, in order to receive clear picture by removing any noise from the signal.

Regarding claims 8 and 18, the combination of Rajendran and Pavlovskaja teach all the claimed elements in claims 5 and 15. In addition, Rajendran teaches the apparatus/the method, wherein said processing means comprises:

frequency converting mean for converting said received signals from a first frequency band to the available frequency band to generate frequency converted signals (Para. 0039). Both fail to teach filtering means for filtering said frequency converted signals to generate said analog signals.

However, in related art, Stoddard teaches filtering means for filtering said frequency converted signals to generate said analog signals (Paragraph 0110).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Stoddard to Rajendran and Pavlovskaja, in order to receive clear picture by removing any noise from the signal.

Regarding claims 9 and 19, the combination of Rajendran and Pavlovskaja teach all the claimed elements in claims 8 and 18. In addition, Rajendran teaches the apparatus/the method, wherein said frequency converting means comprises a signal mixer (See Figure 1, element 150).

10. Claims 4 and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rajendran et al. (US Pub. No. 2004/0017671) in view of Pavlovskaja et al. (US Pub. No. 2006/0117340) in view of Stoddard et al. (US Patent Application Publication #2004/0085143) and further in view of Basawapatna et al (US Patent Application Publication #2004/0163124).

Regarding claims 4 and 14, the combination of Rajendran, Pavlovskaja, and Stoddard teach all the claimed elements in claims 3 and 13, except for the apparatus/the method, wherein:

said first frequency band is greater than 1 GHz; and said second frequency band is less than 1 GHz.

However, in related art, Basawapatna teaches the apparatus, wherein:

said first frequency band is greater than 1 GHz; and said second frequency band is less than 1 GHz (Para. 0025).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to provide the above teaching of Basawapatna to Rajendran, Pavlovskaja, and Stoddard, in order to encrypt the signals or scramble the signals so that only the paying subscribers will be able to descramble or de-encrypt the signals to view the program.

11. Examiner has cited particular columns and line numbers in the references applied to the claims above for the convenience of the applicant. Although the specified citations are representative of the teachings of the art and are applied to specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested from the applicant in preparing responses, to fully consider the references in entirety as potentially teaching all or part of the claimed invention, as well as the context of the passage as taught by the prior art or disclosed

Art Unit: 2618

by the Examiner. SEE MPEP 2141.02 [R-5] VI. PRIOR ART MUST BE CONSIDERED IN ITS ENTIRETY, INCLUDING DISCLOSURES THAT TEACH AWAY FROM THE CLAIMS: A prior art reference must be considered in its entirety, i.e., as a whole, including portions that would lead away from the claimed invention. *W.L. Gore & Associates, Inc. v. Garlock, Inc.*, 721 F.2d 1540, 220 USPQ 303 (Fed. Cir. 1983), cert. denied, 469 U.S. 851 (1984) *In re Fulton*, 391 F.3d 1195, 1201, 73 USPQ2d 1141, 1146 (Fed. Cir. 2004). >See also MPEP §2123.

Response to Arguments

12. Applicant's arguments filed 12/22/2008 have been fully considered but they are not persuasive. Regarding claims 1 and 11, Applicant argues that all of the claims of co-pending application 10/549,259 recite detection of an available frequency band on a transmission medium. Such a recitation is not contained in the independent claims of the instant application. The Examiner respectfully disagrees. Even though detection of an available frequency band on a transmission medium is not contained in independent claims 1 and 11, but all of the recited limitations of claims 1 and 11 are there or found in co-pending application of claims 1 and 10. Moreover, above underlying limitations can be found in claims 5 and 15 of the instant application which are dependent on claims 1 and 11, so they are the part of claims 1 and 11 in instant application. Applicant argues nowhere does Rajendran et al. show or suggest: "control means for enabling generation of said analog signals responsive to a request signal", as specifically recites in claim 1, nor does Rajendran et al. show or suggest: "receiving a request signal from said device

Art Unit: 2618

indicating a channel". The Examiner respectfully disagrees because according to the Office action made on 06/30/2008, those limitations are taught by Pavlovskaia, not by Rajendran. The limitations that are taught by Rajendran are "processing means for receiving satellite signals and processing said received signals to generate analog signals without demodulating the received signals" which are found in Paragraph 0035: Antenna 101 may receive various signals transmitted from satellites, etc. The received signals may be provided to filter 110. Filter 110 may perform a corresponding transfer function to generate signals of the frequencies of interest. The generated signals are provided to LNA 120 in the form of analog signals. The Applicant argues that Rajendran et al. reference can't be combinable with Pavlovskaia et al. (see page 2 of Remarks). The Examiner disagrees. According to claims 1 and 11, Applicant recites limitations "processing means for receiving satellite signals and processing said received signals to generate analog signals without demodulating the received signals". Those limitations are definitely taught by Rajendran et al. (See Paragraph 0035). Further, the limitations "control means for enabling generation of said analog signals responsive to a request signal; and wherein said analog signals are provided to a client device via a transmission medium Cable connecting said apparatus and said client device" are found in Pavlovskaia, Paragraphs 0053-0055. So they are obviously combinable. Applicant argues that cited reference #WO 02/25847 of Zydonik to show the use of RG-59 cable and RG 59 cable were to be used in Rajendran et al., the patentability of the invention defined by claims 1 and 11 would not be affected. The Examiner respectfully disagrees. Since Rajendran and Pavlovskaia are combinable, RG-59 cable definitely can be used

Art Unit: 2618

for transmission of signal or data. According to claims 5 and 15, Applicant argues that Staney reference can't be combinable with Rajendran reference. The Examiner respectfully disagrees. Staney, paragraph 0028, teaches set top box 28 carries multiple channels and is conveyed to a tuner 48 which selects on frequency band out of the available spectrum or frequency and a broadband analog signal (e.g., 680, 750, 860 MHz) received by the set top box 38 carries multiple channels (available frequency band. Above Paragraphs definitely are combinable with both Rajendran and Pavlovskaja, not only Rajendran reference or only Pavlovskaja because claims 1 and 11 were rejected with both references. Same arguments also apply to claims 7,17,3,13,4, and 14.

Conclusion

13. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Art Unit: 2618

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DOMINIC E. REGO whose telephone number is (571)272-8132. The examiner can normally be reached on Monday-Friday, 8:30 am-5 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Duc M. Nguyen can be reached on 571-272-7503. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Dominic E. Rego
/Dominic E Rego/
Examiner, Art Unit 2618
Tel 571-272-8132

/Duc Nguyen/
Supervisory Patent Examiner, Art Unit 2618